## City of Chattanooga, TN

# **Personnel Class Specification**

## Class code 0644

FLSA: Exempt

## CLASSIFICATION TITLE: SEWER ENGINEERING SPECIALIST

## PURPOSE OF CLASSIFICATION

The purpose of this classification is to perform staff engineering work associated with the City's wastewater treatment plant and collection system.

#### **ESSENTIAL FUNCTIONS**

The following duties are normal for this position. These are not to be construed as exclusive or all-inclusive. Other duties may be required and assigned.

Conducts engineering studies of collection system and treatment plant.

Performs research on collection system and treatment plant.

Interprets data to determine best rehabilitation method based on current technical and engineering practices.

Reviews procedures for new sewer rehabilitation.

Reviews plans for new subdivisions; analyzes projected flow data; makes recommendations for correction/redesign; writes letters of recommended changes and final acceptance for signature by city engineer.

Coordinates project activities; investigates project locations; assembles bid documents; calculates cost estimates; monitors work performed.

Conducts field investigation projects to identify problem areas and recommend method of correction.

Performs construction management for rehabilitation contracts; monitors and inspects work performed by outside contractors.

Develops, maintains, and updates the city's database of line replacements, point repairs, cured in place linings, manhole raisings, and root control.

Assists in maintaining and updating city sewer maps.

Evaluates city paving schedule in relation to impact by sewer construction contracts.

Prepares and reviews plans for internal collection system projects; ensures compliance with all applicable codes, laws, standards, and procedures.

Writes equipment specifications and contracts for bid; analyzes bid data.

Compiles or monitors various administrative and statistical data pertaining to departmental operations; makes applicable calculations; reviews and analyzes logs, data sheets, and graphs.

Reviews flow data to determine trends and cost savings; reviews, analyzes, calculates overflow data for state overflow report.

Processes a variety of documentation associated with departmental operations; performs research; analyzes data and identifies trends; prepares or generates reports; maintains records.

Prepares or completes various forms, reports, correspondence, progress reports, logs, purchase requests, budget requests, contracts, specifications, bid tabulations, technical study reports, or other documents.

Receives various forms, reports, correspondence, work orders, invoices, logs, flow reports, statistical data, video tapes, contracts, drawings, graphs, product data sheets, specifications, engineering plans, maps, manuals, policies, procedures, reference materials, or other documentation; reviews, completes, processes, forwards or retains as appropriate.

Operates a computer to enter, retrieve, review or modify data; utilizes word processing, spreadsheet, database, e-mail, computer-aided design, or other software programs.

Attends meetings as needed.

Consults with supervisor, other municipalities, and other officials to provide recommendations, resolve problems, and receive advice/direction;

Communicates with supervisor, employees, other departments, engineers, contractors, vendors/suppliers, the public, outside agencies, and other individuals as needed to coordinate work activities, review status of work, exchange information, resolve problems, or give/receive advice/direction.

Petitions the state for variances to sewer connection moratorium, if in effect.

Communicates via telephone and/or two-way radio; provides information and assistance; takes and relays messages; returns calls as necessary.

Maintains a comprehensive, current knowledge of applicable laws/regulations; maintains an awareness of new trends and advances in the profession; reads professional literature; maintains professional affiliations; attends workshops, product demonstrations, and training sessions as appropriate.

#### **ADDITIONAL FUNCTIONS**

Operates a motor vehicle to conduct work activities.

Collects overflow samples.

Attends construction meetings for system engineers.

Provides assistance to other employees or departments as needed.

Performs other related duties as required.

#### MINIMUM QUALIFICATIONS

Bachelor's degree in Civil Engineering, Sanitary Engineering, Environmental Engineering, or closely related field; supplemented by three (3) years previous experience and/or training that includes wastewater collection system or treatment plant design/operations and civil/sanitary/environmental engineering construction management; or any equivalent combination of education, training, and experience which provides the requisite knowledge, skills, and abilities for this job. Must possess and maintain a valid Tennessee driver's license.

## PERFORMANCE APTITUDES

<u>Data Utilization</u>: Requires the ability to evaluate, audit, deduce, and/or assess data using established criteria. Includes exercising discretion in determining actual or probable consequences and in referencing such evaluation to identify and select alternatives.

<u>Human Interaction:</u> Requires the ability to apply principles of persuasion and/or influence over others in a supervisory capacity.

**Equipment, Machinery, Tools, and Materials Utilization:** Requires the ability to operate, maneuver and/or control the actions of equipment, machinery, tools, and/or materials used in performing essential functions.

<u>Verbal Aptitude:</u> Requires the ability to utilize a wide variety of reference, descriptive, and/or advisory data and information.

<u>Mathematical Aptitude:</u> Requires the ability to perform addition, subtraction, multiplication and division; ability to calculate decimals and percentages; may include ability to perform mathematical operations involving basic algebraic principles and formulas, and basic geometric principles and calculations.

<u>Functional Reasoning:</u> Requires the ability to apply principles of influence systems, such as motivation, incentive, and leadership, and to exercise independent judgment to apply facts and principles for developing approaches and techniques to resolve problems.

<u>Situational Reasoning:</u> Requires the ability to exercise judgment, decisiveness and creativity in situations involving the direction, control and planning of an entire program or set of programs.

#### ADA COMPLIANCE

<u>Physical Ability:</u> Tasks require the ability to exert light physical effort in sedentary to light work, but which may involve some lifting, carrying, pushing and/or pulling of objects and materials of light weight (5-10 pounds). Tasks may involve extended periods of time at a keyboard or work station.

<u>Sensory Requirements</u>: Some tasks require the ability to perceive and discriminate colors or shades of colors, sounds, odor, depth, and visual cues or signals. Some tasks require the ability to communicate orally.

**Environmental Factors:** Performance of essential functions may require exposure to adverse environmental conditions, such as dirt, dust, pollen, odors, wetness, humidity, rain, fumes, temperature and noise extremes, electric currents, traffic hazards, violence, disease, or pathogenic substances.

Chattanooga, Tennessee, is an Equal Opportunity Employer. In compliance with the Americans with Disabilities Act, the City will provide reasonable accommodations to qualified individuals with disabilities and encourages both prospective and current employees to discuss potential accommodations with the employer.